

EXHIBIT 23

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Fourth Edition

On the cover: Pattern produced from white light by a computer-generated diffraction plate containing 529 square apertures arranged in a 23×23 array. (R. B. Hoover, Marshall Space Flight Center)

On the title pages: Aerial photograph of the Sinai Peninsula made by Gemini spacecraft. (NASA)

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detects presence of unwanted metal in an ore stream, and sounds an alarm or removes the metal. { 'tramp 'med-əl di, tek-tər }

tramway [MECH ENG] An overhead rail, rope, or cable on which wheeled cars run to convey a load. { 'tram, wā }

tranexamic acid [PHARM] $C_8H_{15}NO_2$ Crystals which soften at 270°C and are soluble in water; used as a hemostatic agent. Abbreviated AMCHA. { 'tran-ik, sam-ik 'as-əd }

tranquizer [PHARM] 1. Any agent that brings about a state of relief from anxiety, or peace of mind. 2. Any agent that produces a calming or sedative effect without inducing sleep. 3. Any drug, such as chlorpromazine, used primarily for its calming and antipsychotic effects, or such as meprobamate, used for symptomatic treatment of common psychoneuroses and as an adjunct in somatic disorders complicated by anxiety and tension. { 'tran-kwə, liz-ər }

transacter [COMPUT SCI] A system in which data from sources in a number of different locations, as in a factory, are transmitted to a data-processing center and immediately processed by a computer. { tran 'sak-tər }

transaction [COMPUT SCI] General description of updating data relevant to any item. { tran 'sak-shən }

transaction data [COMPUT SCI] A set of data in a data-processing area in which the incidence of the data is essentially random and unpredictable; hours worked, quantities shipped, and amounts invoiced are examples from, respectively, the areas of payroll, accounts receivable, and accounts payable. { tran 'sak-shən, dad-ə }

transaction file See detail file. { tran 'sak-shən, fil }

transaction processing system [COMPUT SCI] A system which processes predefined transactions, one at a time, with direct, on-site entry of the transactions into a terminal, and which produces predefined outputs and maintains the necessary data base. { tran 'sak-shən 'prā, ses-in, sis-təm }

transaction record See change record. { tran 'sak-shən, rek-əd }

transaction tape See change tape. { tran 'sak-shən, tāp }

transadmittance [ELECTR] A specific measure of transfer admittance under a given set of conditions, as in forward transadmittance, interelectrode transadmittance, short-circuit transadmittance, small-signal forward transadmittance, and transadmittance compression ratio. { 'tranz-ad 'mit-əns }

transaminase [BIOCHEM] One of a group of enzymes that catalyze the transfer of the amino group of an amino acid to a keto acid to form another amino acid. Also known as aminotransferase. { 'tranz'am-ə, nās }

transamination [CHEM] 1. The transfer of one or more amino groups from one compound to another. 2. The transposition of an amino group within a single compound. { tran, sam-ə 'nā-shən }

transcapsidation [VIROL] Change in the capsid of PARA (particle aiding replication of adenovirus) from one type of adenovirus to another. { 'tranz, kap-sə 'dā-shən }

transceiver [COMPUT SCI] A device which transmits and receives data from punch card to punch card; it is essentially a conversion device which at the sending end reads the card and transmits the data over the wire, and at the receiving end punches the data into a card. [ELECTR] A radio transmitter and receiver combined in one unit and having switching arrangements such as to permit use of one or more tubes for both transmitting and receiving. Also known as transmitter-receiver. { tran 'sē-vər }

transceiver data link [COMPUT SCI] Integrated data processing by means of punched cards, using transceivers as terminal equipment; the transmission path can be wire or radio. { tran 'sē-vər 'dad-ə, lɪŋk }

transcendental element [MATH] An element of a field K is transcendental relative to a subfield F if it satisfies no polynomial whose coefficients come from F . { 'tran, sen, dent-əl 'el-ə-mənt }

transcendental field extension [MATH] A field extension K of F where the elements of K not in F are all transcendental relative to F . { 'tran, sen, dent-əl 'fēld ik, sten-chen }

transcendental functions [MATH] Functions which cannot be given by any algebraic expression involving only their variables and constants. { 'tran, sen, dent-əl 'fəŋk-shənz }

transcendental number [MATH] An irrational number that is the root of no polynomial with rational-number coefficients. { 'tran, sen, dent-əl 'nəm-bər }

transconductance [ELECTR] An electron-tube rating, equal

to the change in plate current divided grid voltage that causes it, when the voltages are maintained constant.

transconductance; grid-plate transconductance. Symbolized G_m ; g_m .

transcontinental ballistic missile having a range of at least 12,500 miles it can be fired from any point on the any surface target. { 'tranz, kən-tēnāl }

transcribe [COMPUT SCI] To copy, from one external computer storage [ELECTR] To record, as to record of electric transcriptions or magnetic casting. { 'tranz, krīb }

transcriber [COMPUT SCI] The information from one form to another; puter input data to the medium a computer. { 'tranz, krīb-ər }

transcription [ENG ACOUS] A 16 timer), 33 1/3-rpm disk recording of made especially for broadcast purposes transcription. [MOL BIO] The nucleic acid is formed from { 'tranz, krip-shən }

transcrystalline [MET] Across the of cracks in metals. Also known as ular. { 'tranz, krist-əl-ən }

transcurrent fault [GEOL] A strike by a steeply inclined surface. Also { 'tranz, kə-rənt 'fəlt }

transducer [ENG] Any device or input signal into an output signal of include the microphone, phonograph rometer, photoelectric cell, autom underwater sound transducer. { tra transducer loss [ELECTR] The ratio to a transducer from a specified son transducer delivers to a specified } decibels. { 'tranz, dū-sər, lōs }

transduction [MICROBIO] Transfer between bacterial cells by bacteriophage

transductor See magnetic amplifier { 'tranz, dək-tər }

transect [SCI TECH] To cut across { 'tran, sekt }

transesterification [ORG CHEM] acid ester into another ester of that } 'ə-fə 'kā-shən }

transfection [GEN] Infection of a nucleic acid or ribonucleic acid. {

transfer [COMPUT SCI] See jump. inclined connection between two or pass. [NAV] 1. The distance a vessel to its initial direction in making a t rudder angle. 2. The distance a vessel its initial direction for turns of less t

transfer admittance [ELECTR] electron tubes and other transducers the complex alternating component terminal from its external terminating alternating component of the volta terminal on the cathode or reference have arbitrary external terminations

transferase [BIOCHEM] Any of various the transfer of a chemical group from { 'tranz, fə, rās }

transfer caliper [DES ENG] A caliper can be opened (or closed) to remove piece being measured; used to measure projections. { 'tranz-fər, kal-ə-pər }

transfer car [MIN ENG] A quarry car tracks, on which the gang car may saw gang. { 'tranz-fər, kār }

transfer card See transition card.

transfer chamber [ENG] In plastic which thermosetting plastic is soft before being placed in a closed mold } 'fər, chām-bər }

transfer characteristic [ELECTR]